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Purpose

(1) The objective of this standard operating procedure is to provide guidance to the Charles Sturt University staff on:

a. The technique for applying a nose (upper lip) twitch to a horse.

Scope

(2) This procedure applies to any person who is involved in AEC approved projects involving applying a nose twitch to horses.

- (3) The twitches referred to in this SOP are those consisting of a handle with a loop of rope at the end (as shown in Figure 1). This SOP does not apply to aluminium screw twitches or the 'humane' twitch.
- (4) All researchers and teaching staff using animals for scientific purposes must be competent.
- (5) For definition of competency refer to Charles Sturt University's Policy on <u>Animal Care</u>

 <u>Competency Training and Assessment.</u>
- (6) A nose twitch should not be used if the horse is able to be held safely.
- (7) Twitching a horse's upper lip is a useful technique for restraint but it should only be used when treatment without a twitch cannot be done. It can be helpful to allow treatment of painful wounds and other short-lasting procedures such as stomach tubing.
- (8) IMPORTANT NOTE. Ear twitching is not permitted under any circumstances during teaching or research activities and should never be employed as an alternative to nose twitching.

Details of procedure

Safety and risk considerations

(9) Horses may be dangerous by virtue of their nature, size, ability to use multiple avoidance and escape behaviours (including body movements, kicking, biting and barging). Changes in behaviour can be rapid and difficult to detect to an untrained eye. They can cause severe and sometimes fatal injuries to the handler and/or bystanders. Signs of distress include the behaviours noted above, in addition to moving away, swinging of the head, and striking at operator. Risk of injury can be minimised by ensuring that personnel involved are adequately



trained in the handling and restraint of horses, and familiar with both the normal and flight-related behaviour of horses.

Equipment required

- (10) Nose twitch, protective footwear and disposable gloves.
- (11) Disposable gloves are required as there is a biosecurity risk with nasal/salivary secretions.

Application

- (12) If possible, allow the owner or regular handler to hold the horse with a halter/head collar and lead rope or bridle.
- (13) Assess the suitability of a nose twitch vs chemical restraint for the horse and situation.
- (14) Ensure the immediate environment is as controlled as possible, with unnecessary personnel, animals and arousing stimuli minimised.
- (15) In most instances the handler will stand to the left of the horse. The operator should apply the twitch from the side the veterinarian/person carrying out procedure will be working from.
- (16) Thread the fingers of the left hand through the loop of the rope twitch, keeping the little finger behind the loop. Grasp the horse's upper lip with the left hand 3 middle fingers and thumb. Using the right hand, slip the loop over the left hand and slide it well onto the lip (with 2/3s being inside the loop). Twist the handle toward the horse's eye, to tighten the loop around the lip until it is secure (See Figure 1). Care must be taken to not partially or totally block the nostrils of the horse with the operator's hand.
- (17) If the horse has a lead rope attached, a loop of the lead rope should be wound around the twitch handle to prevent injury if the horse moves unexpectedly.
- (18) Under no circumstances should the twitch be used to reposition the horse.
- (19) The twitch is too tight if there is evidence of blood on the twitch, blanching of the mucous membranes, excessive coolness of the muzzle or signs of pain. If any of these signs are observed the twitch should be loosened until these signs stop.
- (20) The twitch should be in place for no longer than 5 minutes as the restraint loses its effect after this time.
- (21) If restraint is required for longer than 5 minutes the operator may consider either chemical restraint, or re-applying the nose twitch for a maximum of a further five minutes if chemical restraint is unwarranted.
- (22) The twitch is released by untwisting and removing from the nose when sufficiently loose.



(23) The horse's nose is then gently massaged after withdrawal of the twitch and the horse monitored for any adverse signs.

Drugs, chemicals, or biological agents

(24) Typically, no other drugs or chemicals are used when a nose twitch is applied. However, on occasion a twitch may augment other treatments.

Impact of procedure on wellbeing of animals

(25) Nose twitches can lead to unwanted behaviours. Misuse of twitches can lead to physical damage, head shyness, and negative behavioural outcomes both in the short and long-term.

Animal care

(26) Observe animals for signs of excessive distress. If observed, discontinue use immediately.

Pain relief

(27) Not required.

Reuse and repeated use

- (28) Procedures should only be repeated a maximum of two times per animal for demonstration during teaching or research activities.
- (29) Wherever possible for individuals involved in research, time should be taken to habituate the animals to the data collection procedures to be applied prior to commencement of the research trial.
- (30) Strong-consideration should be given to training horses ahead of receiving clinical procedures, or for those who have had negative experiences, behavioural rehabilitation in order that twitch use can be minimised.

Qualifications, experience or training necessary to perform this procedure

(31) Personnel should be competent in handling, ethical restraint and understanding equine behaviour. Specifically, they should be aware of the signs of fear, anxiety and pain e.g., ears



- back, ears flicking repeatedly, pawing, striking, attempting to rear, biting, excessive shifting of weight.
- (32) All movements and activities should be based on the operators' understanding of equine behaviour and understanding of the horse's senses. This includes being as quiet as is practical, ensuring that the horse is aware of where people are at all times, avoiding sharp rapid movements, and in particular being aware of the horse's blind spots.

Demonstrator

(33) Operators should be familiar with the correct techniques and the normal behaviour of horses before attempting this procedure.

Students

- (34) Procedures should be clearly demonstrated before students attempt them.
- (35) Students should be aware of the requirements for correct and safe technique when applying a nose twitch to a horse.

Record requirements

(36) None required.

Associated documentation (including pictures if available)



Figure 1- Application of nose twitch to a horse (Chapman, 2017)



Glossary

(32) None required

References and relevant links

- Ali, A.B.A., Gutwein, K.L. and Heleski, C.R. 2017. Assessing the influence of upper lip twitching in naïve horses during an aversive husbandry procedure (ear clipping), *Journal of Veterinary Behavior*, 21, 20-25.
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